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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/526,576

09/07/2005

Raymond Bertholet

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EXAMINER

PADEN, CAROLYN A

ART UNIT

PAPER NUMBER

1794

NOTIFICATION DATE

DELIVERY MODE

10/02/2008

ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

PATENTS@BELLBOYD.COM

Office Action Summary	Application No. 10/526,576	Applicant(s) BERTHOLET ET AL.	
	Examiner Carolyn A. Paden	Art Unit 1794	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 13 October 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-23 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-23 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date <u>10-13-06</u> | 6) <input type="checkbox"/> Other: _____ |

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-5, 8, 11 and 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Biji (EP 1,178,118) in view of Bailey's.

Biji was cited as an X reference in an international application. Biji discloses isolation of microbial oils. The microbial is prepared by fermentation of microbial cells. Then the cells are pasteurized, washed and the cell walls are lysed or disrupted by mechanical means (abstract). More than one extraction process is described at column 3. In paragraph 0016 the oil is extracted by a mechanical technique that may use a ball mill or cold pressing. Separation of the oil from the cell debris is shown in paragraph 0021. Deodorization and Bleaching are shown in paragraph 0027. The polyunsaturated oil in the microbial cells is shown in paragraph 0009. Recovery of polyunsaturated fatty acids in triglyceride form is shown in paragraph 0026. The claims appear to differ from Biji in the recitation of the use of an adsorbent. Bailey teaches that purifying crude edible oil stocks is known in the art. On pages 3 and 13 the overall process of

refining edible oil is shown. On page 28, treatment of oil with bleaching clay as an adsorbent is shown. Deodorizing is shown on page 47.

Distilling oils is disclosed on page 350 to be a way to reduce the free fatty acid content of the oils during deodorization. It would have been obvious to one of ordinary skill in the art to utilize the bleaching clay of Bailey's in Biji in order to provide oil with a good color.

Claims 6, 7, 9, 10, 12-17, 19-23 are rejected under 35 U.S.C. 103(a) as being unpatentable over Biji in view of Bailey's as applied to claims 1-5, 8, 11 and 18 above, and further in view of Martek (WO 92/12711 or US 5,550,156) in view of Polman (GB 2,241,503).

The claims appear to differ from Biji in view of Bailey's in the recitation of the use of carrier oil with the microbial oil. Martek teaches microbial oil mixtures and uses thereof. On page 4, lines 21-25 the use of the oil for pharmaceutical and cosmetic purposes is mentioned and at line 1 the use of the oil in dietary supplements is suggested. In example 7 an oil combination of fish oil and microbial oil is contemplated for infant formula. The microbial oil was stated to contain 33% ARA. In example 8, Menhaden oil is combined with black current oil and microbial oil. The isolation of the oils in Martek is described as known in the art at the bottom of page 6. So

Martek provides evidence that it is known in the art to combine microbial oils with other oils and that it is known to use them in foods. Polman teaches a specific refining process for fish oils and is a way to treat highly unsaturated oil. Polman teaches that fish oils are a known source of PUFA fatty acids, such as EPA and DHA. Polman also teaches stabilizing fish oils by blending them with vegetable oil. In example 1, vegetable oils are degummed with phosphoric acid, neutralized with sodium hydroxide, blended with fish oil, degummed again with phosphoric acid and subsequently neutralized with sodium hydroxide. The references taken together teach refining combinations of oils together as a known in the art to treat unsaturated oils. Polman especially teaches the advantage of combining unsaturated oil with vegetable oil as a way to safely refine unsaturated oil. Given the lack of stability of unsaturated oil shown by Polman, it would have been obvious to one of ordinary in the art to extract the microbial oil of Biji with carrier oil, like vegetable oil to preserve the microbial oil and minimize the potential problem of a fire hazard resulting from the cell wall cakes remaining after extraction.

Claims 1-23 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-19

of copending Application No. 10/658,522. Although the conflicting claims are not identical, they are not patentably distinct from each other because both applications are directed to a process from preparing oil from a microorganism and the oil resulting from the process. It is not seen that the process or the oil from the process are patentably different from each other.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

Claims 1-23 are provisionally rejected under 35 U.S.C. 103(a) as being obvious over copending Application No. 10/658,522 which has a common inventor with the instant application. Based upon the earlier effective U.S. filing date of the copending application, it would constitute prior art under 35 U.S.C. 102(e) if published or patented. This provisional rejection under 35 U.S.C. 103(a) is based upon a presumption of future publication or patenting of the conflicting application.

Both applications are directed to a process from preparing an oil from a microorganism and the oil resulting from the process. It is not seen that the process or the oil from the process are patentably different from each other.

This provisional rejection might be overcome either by a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the copending application was derived from the inventor of this application and is thus not the invention "by another," or by a showing of a date of invention for the instant application prior to the effective U.S. filing date of the copending application under 37 CFR 1.131. This rejection might also be overcome by showing that the copending application is disqualified under 35 U.S.C. 103(c) as prior art in a rejection under 35 U.S.C. 103(a). See MPEP § 706.02(I)(1) and § 706.02(I)(2).

Claims 7-10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Kyle (WO 96/21037) in view of Pagliaro (4,465,699).

Kyle discloses the preparation of oil from microorganisms. The oil is extracted by removing residual water, wet grinding and then solvent extraction (page 13-15). Anaerobic extraction helps to avoid oxidation of the oil. The concept of extracting the oils under nitrogen or in the presence of antioxidant is discussed on page 15. The claims appear to differ from Kyle in the inclusion of carrier oil. Pagliaro teaches the use of vegetable oil as a solvent for extracting caffeine from coffee. Vegetable oil is described as a safe alternative to organic solvent. It would have been obvious to a

person of ordinary skill in the art to use oils to extract microbial oil from biomass instead of hexane as a safe alternative to the use of an organic solvent.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Carolyn A Paden whose telephone number is (571) 272-1403. The examiner can normally be reached on Monday to Friday from 7 am to 3:30 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Milton Cano, can be reached by dialing 571-272-1398. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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/Carolyn Paden/

Primary Examiner 1794